

## Secure, Deterministic Cross Domain File Transfer

In intelligence and defense operations, files must sometimes flow from networks of lower security levels to networks of higher security. Specifically, files often must be transferred low-to-high (L2H) from unclassified networks into classified networks, up to Top Secret. In these cases, a reliable and accredited cross domain solution (CDS) must be utilized to ensure validation of the files and the protection of the higher security network.

### The Owl Solution

The OCDS-FT15 is a certified and accredited cross domain solution, which has passed NCDSMO testing and has received authorization to operate (ATO). It was designed as a one-way data transfer solution moving files from unclassified domains to Top Secret networks. The OCDS-FT15 features two servers packaged in a single 1U rackmount enclosure – the OCDS-1000 hardware platform.

# **Highly Secure Configuration**

OCDS-FT15 is configured solely for a single mission: to provide certifiable, hardware-enforced one-way file transfer. Operating on a locked-down RHEL OS, the OCDS-FT15 features a closed hardware architecture, and trusts no outside connection. It is deployed with a STIG-compliant Certifiable Linux Integration Platform-based (CLIP) operating system with SE Linux in enforcing mode, which does not permit any backchannel communication.



#### **FEATURES**

The OCDS-FT15 supports up to five concurrent file transfer paths and presents a modular design that facilitates further tailoring to satisfy changing mission requirements and expedited deltacertification (regression testing) processes. Machine-to-machine file transfer interfaces implement source authentication and encryption using Owl Remote File Transfer Service (RFTS) software. CDS administration is local via KVM console or remote via SSH interface.

- + Absolute bandwidth capacity up to 1 Gbps
- + Authorized for 71 file types, including .txt, .xml, .csv, and .sql
- + Equipped with multiple data filters ClamAV, ASCII, and File name/size/type
- + Supports up to five concurrent file transfer paths
- + Separate, yet concurrent, availability to wide-ranging user apps & security policies
- + Enforces disparate user needs & security policies
- + 1U hardware architecture satisfies requirements for low SWaP

#### **OCDS-FT15 IN ACTION**

Tactical and reconnaissance data is collected and aggregated into intelligence files which must be transferred to secure enclaves for analysis. The OCDS-FT15 securely transfers these files one-way from the unclassified network to a Top-Secret secure facility. The OCDS-FT15 data diode is also configured with built-in data filters and antivirus software to assure the integrity and confidentiality of the data transfer.



#### **ACCREDITED & ATO GRANTED**

The OCDS-FT15 has passed both CT&E and ST&E NCDSMO testing phases and has received authorization to operate. It is comprised of two host computer platforms connected with Owl DualDiode Technology™, and provides an absolute bandwidth capacity up to 155 Mbps. Administration of each server within the CDS Accreditation Boundary (corresponding to the 1U enclosure) is entirely independent of the other.

The OCDS-FT15 utilizes the OCDS-1000 hardware architecture, which features Single Board Computer (SBC) host computer platforms to satisfy requirements for small size, low weight, and low power (SWaP). Software architecture upgrades include STIG-compliant Certifiable Linux Integration Platform (CLIP) operating system based on RHEL. Hardware and software architecture operate as an assured data transfer pipeline.

This defense-in-depth solution includes security features mapped to the NCDSMO ICD-503 (which includes NIST SP 800-53).



# **Technical Specifications**

#### **OPERATING CONDITIONS**

• 32°F to 110°F (0°C to 43.33°C) - 20% to 85% humidity non-condensing

#### **POWER SUPPLY**

- Input: 100-240V AC auto-ranging, min. 30W per side (fused at 1A at IEC connector)
- Output: 5V at 5A
- EU & UK power cables available upon request

#### **POWER CONSUMPTION**

- BLUE Inlet Send-only side: 20W Max / 17.6W Nominal / 5.5W Standby
- RED Outlet Receive-only side: 20W Max / 17.5W Nominal / 5.5W Standby

### STORAGE

• -40°F to 158°F (-40°C to 70°C) - 5% to 95% humidity non-condensing

#### **SAFETY STANDARDS**

• UL60950-1, TUV EN60950-1 approved

#### TRANSPORT TESTING

• Random Vibration and Loose Cargo Transportation Tests -- MIL-STD-810F

#### CHASSIS

• Black anodized aluminum

#### **CHASSIS SIZE**

• 16.5" W x 1.75" H x 13" D (41.91 cm W x 4.5 cm H x 33 cm D)

### **UNIT WEIGHT**

• 7.92 lbs (3.6 kg)

#### **SHIPPING WEIGHT**

• 12.2 lbs (5.5 kg)

#### **SHIPPING SIZE**

• 18" W x 8.5" H x 15" D (45.7 cm W x 21.6 cm H x 38.1 cm D)



Owl Cyber Defense Solutions, LLC leads the world in data diode and cross domain network cybersecurity. With a constant focus on customers in the military, government, critical infrastructure, and commercial communities, Owl develops market-first, one-way data transfer products to meet a variety of operational needs, from entry level to enterprise.

For more information on Owl, or to schedule a demo, visit www.owlcyberdefense.com







